



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/396,429	09/15/1999	JOHN S. HENDRICKS	SEDN/5815	7434
56015 7590 05/17/2007 PATTERSON & SHERIDAN, LLP/ SEDNA PATENT SERVICES, LLC 595 SHREWSBURY AVENUE SUITE 100 SHREWSBURY, NJ 07702			EXAMINER KOENIG, ANDREW Y	
			ART UNIT 2623	PAPER NUMBER
			MAIL DATE 05/17/2007	DELIVERY MODE PAPER

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Office Action Summary	Application No. 09/396,429	Applicant(s) HENDRICKS ET AL.	
	Examiner Andrew Y. Koenig	Art Unit 2623	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 19 April 2007.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,3-9,14,18,19,23,24,28-32,34,37,40-43,45-50,52,53 and 55-64 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,3-9,14,18,19,23,24,28-32,34,37,40-43,45-50,52,53 and 55-64 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| 3) <input type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08)
Paper No(s)/Mail Date _____ | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Response to Arguments

1. Applicant's arguments with respect to claims 1, 3-9, 14, 18, 19, 23, 24, 28, 29, 42, 43, 45-50, 52, 53, 55, 56, and 58-64 have been considered but are moot in view of the new ground(s) of rejection.

2. Applicant's arguments filed 10 May 2007 have been fully considered but they are not persuasive.

Regarding claims 30-32, 34, 37, and 40-41, the applicant argues that Palazzi, Banker, and Florin do not disclose, teach, or suggest any hardware upgrade that allows a preexisting modem of the television terminal to be upgraded for generating menus having interactive services that access on-line databases. The examiner disagrees; Palazzi discloses a modem for accessing interactive services/on-line databases provided by the host databases throughout the entire reference including but not limited to column 1, line 5 - column 4, line 45, column 5, lines 63-66 and column 9, line 60 - column 10, line 35. The examiner notes that the presence of a modem can reasonably be construed as an upgrade as the system of Palazzi is an upgrade to other terminals without this functionality. In addition, Palazzi teaches generating menus comprising information from an interactive service (col. 9, ll. 3-20, col. 10, ll. 5-35). As discussed above, it is clear that by increasing the functionality of the modem as taught by Palazzi is an upgrade in that the modem of Palazzi increases and improves the device. Accordingly, the combination of Palazzi, Banker, and Florin teaches the claimed

limitations. Contrary to the applicant's arguments, claim 30 does not recite a hardware upgrade card that is insertable into the set top terminal, but merely an upgrade for upgrading the television terminal.

The examiner notes that the presence of a modem can reasonably be construed as a an upgrade as the system of Palazzi is an upgrade to other terminals without this functionality. In addition, Palazzi teaches generating menus comprising information from an interactive service (col. 9, ll. 3-20, col. 10, ll. 5-35). Accordingly, the combination of Graczyk, Banker, Palazzi, Granger, and Florin teaches the claimed limitations.

The applicant argues that Palazzi Granger and Florin do not teach allowing actual transactions using two way communication over the modem with the interactive service via submenus. The examiner disagrees; Palazzi discloses a modem for accessing interactive services/on-line databases provided by the host databases throughout the entire reference including but not limited to column 1, line 5 - column 4, line 45, column 5, lines 63-66 and column 9, line 60 - column. 10, line 35. Further, Palazzi teaches that the information is interactive in that the user can retrieve specific information (col. 10, ll. 6-35), and that modem transactions are two-way communications over the modem (in that they use handshaking) (col. 5, ll. 64-66) with the interactive service via submenus (col. 8-9, ll. 63-20), which reads on allowing actual transactions using two way communication over the modem with the interactive service via submenus.

The applicant further argues that Granger and Florin are not prior art, and the parent application has an effective filing date of 09 December 1992, and the parent application discloses a modem, an upgrade card, and possible hardware upgrades such as the level B interactive unit. The examiner recognizes these distinctions, however, a general teaching of a hardware upgrade with modem functionalities does not provide evidence of each limitation in the claim. For example, claim 30 recites that the modem communicates with the interactive service and an on-line database, wherein the interactive service and the on-line database are outside of the television program delivery system, the specification of the parent application filed 09 December 1992, merely discusses communications with outside services (see page. 55, ll. 3-6), but not outside of the television program delivery system as claimed. As for claim 42, there is no support in the parent application filed 09 December 1992 for "a hardware upgrade inserted into the set top terminal" instead the hardware upgrade is merely connected to the device with a connector, such as a multi-pin connector (see specification of 07/991,074, pg. 54, ll. 1-14). From the disclosure of the parent application, the hardware upgrade is not inserted into the set top terminal, but is merely connected to the terminal via a connection. The applicant apparently relies on the card 700 of figure 7b, which shows the upgrade card for generating the desired menus, and separate modem (627). The examiner notes that figure 9a and 9b show upgrade configurations for upgrading a simple decompression box (720). As a result, the applicant has provided no evidence that the parent application filed 09 December 1992 possessed any additional upgrade to the menu upgrade (700) and the simple decompression box.

Claim Rejections - 35 USC § 112

3. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

4. Claims 1, 3-9, 14, 18, 19, 23, 24, 28, 29, 42, 43, 45-50, 52, 53, 55, 56, and 58-64 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the enablement requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to enable one skilled in the art to which it pertains, or with which it is most nearly connected, to make and/or use the invention.

Regarding independent claims 1, 14, 24, 42, and 60, The specification provides support for a hardware upgrade card insertable into the set top terminal to add a data modulation and demodulation function to the set top terminal. However, the specification does not describe a way to enable one skilled in the art to make the connection. The specification merely discusses that it is electrically connected either a serial or parallel interface, but does not discuss which serial or parallel interface is being used (see specification: pg. 37, ll. 8-26). The specification's supports a module upgrade using of a SCSI port, but this appears to be used for external connections and not inserted into the set top terminal. Further the state of the prior art does not appear to provide insight on how to make this connection with a set top terminal.

The examiner notes that the embodiments using multipin connections (DB9, DB25, or SCSI) are directed to upgrade module 300 (pg. 30, ll. 8-13) for a simple

Art Unit: 2623

decompression box 302, which is separate from the modem upgrade as shown in figure 12a.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. Claims 30-32, 34, 37, 40-41, 45-50, 55, 56 and 58-59 are rejected under 35 U.S.C. 103(a) as being unpatentable over Palazzi (of record) (U.S. Patent 5,327,554) in view of Banker et al. (Banker) (U.S. Patent 5,357,276) and Florin (U.S. Patent 5,583,560).

Considering claim 30, Banker discloses a television terminal (40,44, or 48) having microprocessor (128,136) instructions for prompting generation of menus, the television terminal comprising:

a) a television program receiver (100,150) for receiving television programs from one or more headends (10);

b) an interface (124, 126) to the television terminal for receiving and processing subscriber input (col. 5, lines 7-25);

c) modem (col. 4, lines 40-50) communicating with one or more headend (10), wherein the receiver receives television program signals based on subscriber input (see the entire reference including but not limited to col. 4, lines 40-57), wherein the terminal

Art Unit: 2623

downloads data from one or more headends to a local storage (col. 6, line 59 – col. 7, line 3 and col. 7, lines 24-28);

d) an output (142, TV 42) connected to the receiver (100,150) and the modem, wherein the output accepts television program signals from the receiver.

Banker fail to specifically disclose an output that accepts data signals from the modem and a modem that downloads data from one or more headend to a local storage, wherein the data comprising information from an interactive service for accessing an on-line database thereby allowing actual transactions using two-way communications over the modem with the interactive service via submenus as recited in the claim.

Palazzi discloses a television terminal comprising a television program receiver (11), a modem (4) an output (9, 10, 15) connected to the receiver (11) and modem (4), wherein the output accepts television program signals from the receiver and data signals from the modem and wherein the modem downloads data from one or more central facility (headend) to a local storage, wherein the data comprises information from an interactive service for accessing an on-line database thereby allowing actual transactions using two-way communications over the modem with the interactive service via submenus. Palazzi's system provides an efficient system for creating an interactive display terminal for accessing information stored at a central facility and for downloading data for later retrieval. See abstract, col. 3, line 64 - col. 4, line 44 and col. 6, lines 17-38.

It would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Banker's system to include an output that accepts data signals from a modem and a modem that downloads data from a central facility (such as a headend) to a local storage, wherein the data comprises information from an interactive service for accessing an on-line database thereby allowing actual transactions using two-way communications over the modem with the interactive service via submenus as taught by Palazzi, for the advantages of providing an efficient interactive display terminal that accesses information stored at a central facility and downloads data to a local storage for later retrieval.

Additionally, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Banker's system (if necessary) to include downloading data from a headend to local storage in a television terminal via a modem since Palazzi demonstrated that modems are used to receive data for local storage in a television terminal from central facilities.

Palazzi and Banker both teaches the use of modems, further Banker teaches the use of a modem in a set top terminal; however Palazzi and Banker are silent on a set top terminal with a modem hardware upgrade.

In analogous art, Florin teaches upgrade modules such as a modem, where a modem by definition is a modulator and demodulation, and thus adds data modulation and demodulation to the television terminal (col. 10, ll. 21-26). Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Banker and Palazzi by using a modem upgrade module and adding data

modulation and demodulation to the television terminal with the upgrade as taught by Florin in order to provide an upgradeable set top terminal thereby increasing the functionality of the device while permitting the user to add hardware for additional functionality.

Banker teaches the use of a modem in a set top terminal, and Florin teaches a set top terminal with a modem upgrade; however Banker, Palazzi, and Florin are silent on a card insertable into the set top terminal. Granger teaches a set top converter (claimed set top terminal) that receives a switching module, which is an upgrade module (see figures 6 and 7, col. 7, lines 20-27), which equates to a card insertable into the set top terminal. Therefore, it would have been obvious to one of ordinary skill in the art at the time the invention was made to modify Banker, Palazzi and Florin by having an upgrade card insertable into the set top terminal as taught by Granger in order to provide additional functionality to an existing terminal and reducing the cost of the set top terminal before the upgrade.

The combined systems of Banker and Palazzi, wherein Palazzi discloses interactive services/on-line databases provided by the host databases that are external to the television program delivery system throughout the entire reference including but not limited to column 1, line 5 - column 4, line 45, column 5, lines 63-66 and column 9, line 60 - column. 10, line 35.

Claim 31 is met by the combined systems of Banker and Palazzi, wherein Banker discloses television (42,46 or 50, figure 1) and Palazzi discloses television (15).

Claim 32 is met by the combined systems of Banker and Palazzi, wherein Palazzi discloses a connector port (10) and Banker's modulator (142) is inherently connected to television (42) via a connector port.

Claim 34 is met by the combined systems of Banker and Palazzi, wherein Banker discloses a memory (137,134) and Palazzi discloses a memory at col. 6, lines 18-45, 53-54, col. 7, lines 62-68 and col. 9, lines 20-40.

Claim 37 is met by the combined systems of Banker and Palazzi, wherein Palazzi discloses interactive services/on-line databases provided by the host databases that are external to the television program delivery system throughout the entire reference including but not limited to column 1, line 5 - column 4, line 45, column 5, lines 63-66 and column 9, line 60 - column. 10, line 35.

Claim 40 are met by the combined systems of Banker and Palazzi, wherein Palazzi discloses online database(s) containing travel information, stock quotation and other data throughout the reference including but not limited to col. 1, lines 15-23, col. 3, lines 25-60 and col. 9, line 60 - col. 10, line 35.

Claim 41 are met by the combined systems of Banker and Palazzi, wherein Palazzi discloses HDTV capability in col. 6, lines 55-64.

Conclusion

7. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

Art Unit: 2623

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Andrew Y. Koenig whose telephone number is (571) 272-7296. The examiner can normally be reached on M-Fr (8:30 - 5:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, John Miller can be reached on (571)272-7353. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Art Unit: 2623

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.



Andrew Y Koenig
Primary Examiner
Art Unit 2623

ayk